

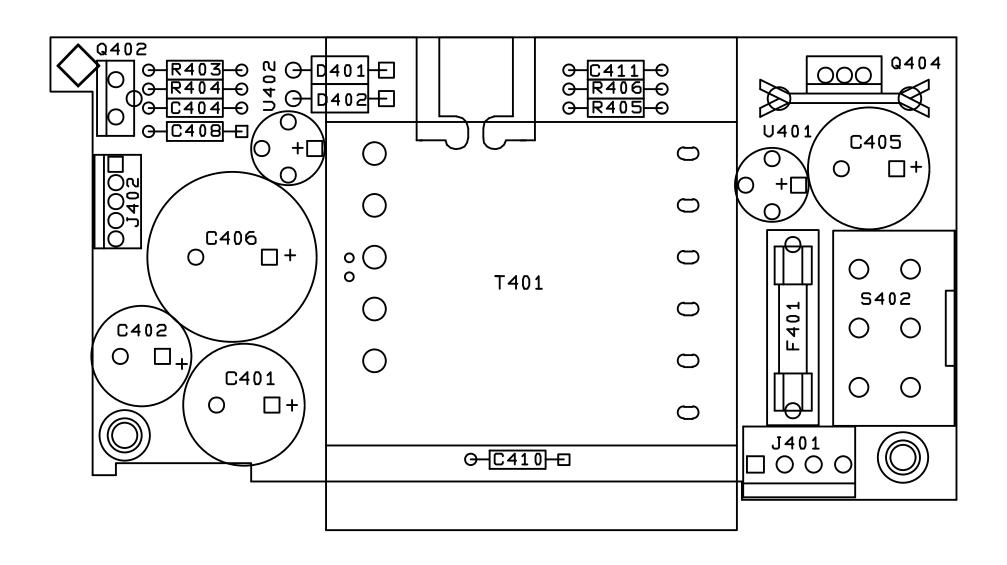
# Agilent 66105A DC Power Module 120V, 1.25A Component Level Information

Information in this packet applies to the following assemblies:

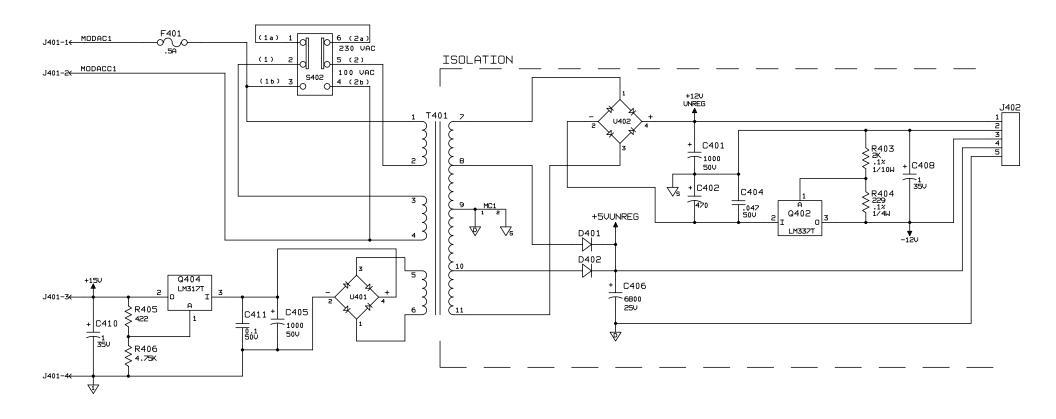
- 1. 5060-3352 Bias Board Assembly
- 2. 66105-60022 Power Board Assembly

The following is included in this packet:

- 1. Component Locators
- 2. Schematics
- 3. Parts lists with Agilent and manufacturer's part numbers



5060-3352 Bias Board Assembly Component Locator



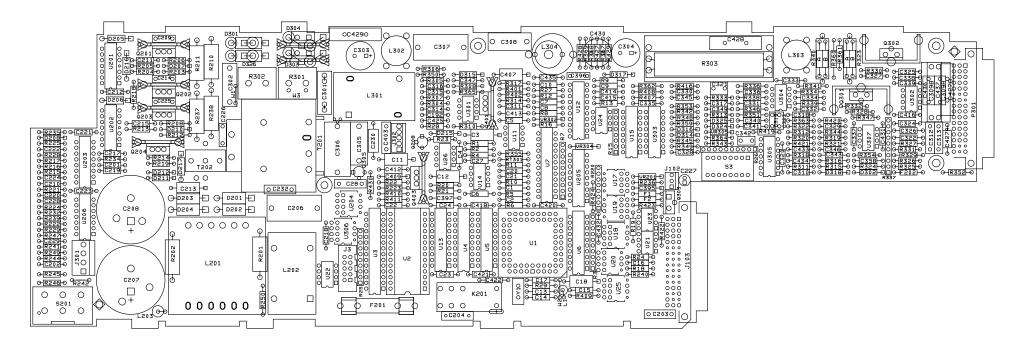
5060-3352 Bias Board Assembly Page 1 of 1

## 5060-3352 Bias Board Parts List

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
C401, 405	2		CAP-FXD 1000uF +-20pct 50 V AL-ELCTLT	ELXZ500ELL102ML25S	NIPPON CHEMI-CON
C402	1		CAP-FXD 1000uF +-20pct 50 V AL-ELCTLT	SMG50VB102M12X25FT	NIPPON CHEMI-CON
C404	1		CAP-FXD 0.047uF +-20pct 50 V CER X7R	C420C473M5R5CA DA13X7R1H473M SA205C473MAAH	KEMET ELECTRONICS TDK AVX
C406	1	0180-4389	CAP-FXD 6800uF +-20pct 25 V AL-ELCTLT	SMG25VB682M22X30LL UVR1E682MRD6	NIPPON CHEMI-CON NICHICON
C408, 410	2	0180-4129	CAP-FXD 1uF +-10pct 35 V TA	TARR105K035 T322B105K035AS	AVX KEMET ELECTRONICS
C411	1	0160-4835	CAP-FXD 0.1uF +-10pct 50 V CER X7R	C420C104K5R5CA SA105C104KAAH SA105C104KAAH	KEMET ELECTRONICS AVX KYOCERA
D401, 402	2	1901-0731	DIODE-PWR RECT 400V 1A	1N4004G 1901-0731 GP10G044	ON SEMICONDUCTOR TEMIC TELEFUNKEN MICROELECTRON VISHAY
F401	1	2110-0820	FUSE (METRIC) .5A 250V FE UL-LST CSA	217.500P	LITTELFUSE
F401a	1		FUSEHLDR-CLP-TYP 6.3A 250V UL/CSA	OGN 031.8201	SCHURTER
J401	1		CONN-POST TYPE .156-PIN-SPCG-MTG-END	26-60-4040	MOLEX
J402	1	1251-8676	CONN-POST TYPE .100-PIN-SPCG-MTG-END	1107-8-105-01	METHODE ELECTRONICS
Q402	1	1826-0527	IC PWR MGT-V-REG-ADJ-NEG 1.2/37V 3 PINS	LM337T-NOPB	NATIONAL SEMICONDUCTOR
Q404	1		ASSY-HS 317T		
Q404a	1	0361-1641	EYELET-RLD-FLG .121-OD .187-LG .0095-THK	GS 4-6 STEEL-TIN PLATE	STIMPSON EDWIN B
Q404b	1	1826-0393	IC PWR MGT-V-REG-ADJ-POS 1.2/37V 3 PINS	LM317T-NOPB	NATIONAL SEMICONDUCTOR
Q404c	1	1205-0282	HEAT SINK PLSTC-PWR-CS	6025D	AAVID THERMALLOY
R403	1	0699-0486	RESISTOR 2K +-0.1pct .1W TF TC=0+-10	PR1/10TC102K0.1% PTF-562K0BT-13 UXBB2K0000B	PRECISION RESISTIVE PRODUCTS VISHAY VISHAY BC COMPONENTS
R404	1	0699-1069	RESISTOR 229 +-0.1pct .125W TF TC=0+-25	B0207E229R0B CMF-552290BT-9	VISHAY BC COMPONENTS VISHAY
R405	1	0698-3447	RESISTOR 422 +-1pct .125W TF TC=0+-100	5053HD422R0F CMF-554220FT-1 NK4H.125W1%+/- 100PPM422R0	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS

## 5060-3352 Bias Board Parts List

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
R406	1	0757-0437	RESISTOR 4.75K +-1pct .125W TF TC=0+-100	5053HD4K750F CMF-554751FT-1 NK4H.125W1%+/- 100PPM4751	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
S402	1	3101-2966	SWITCH-SL DPDT STD 5A 250VAC PC	4021.4922	MARQUARDT
T401	1	9100-4932	XFMR-BIAS	9100-4932	AGILENT TECHNOLOGIES
U401, 402	2	1906-0006	DIODE-FW BRDG 400V 1A	W04G W04M	VISHAY MICROSEMI



Magnify to see component reference designators.

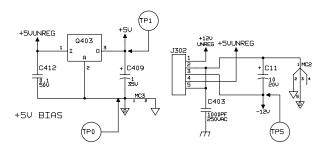
#### **NOTE**

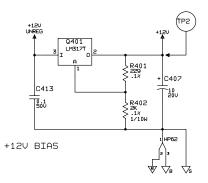
This assembly is used on the 66101A - 66106A. Not all components are loaded for every model. Each model is loaded with the unique parts for the specified output of that model.

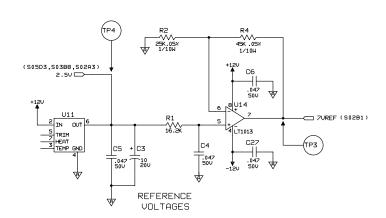
Please refer to the Parts List that follows the schematics for the parts that are specific to the Agilent 66105A. The schematics indicate the parts loaded for the 66105A.

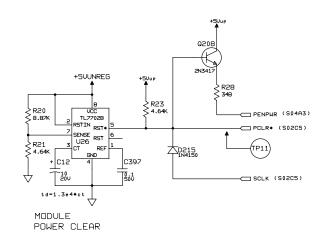
> Agilent 66105A DC Power Module, 120V, 1.25A

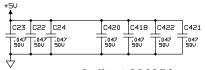
66105-60022 Power Board Assembly Component Locator



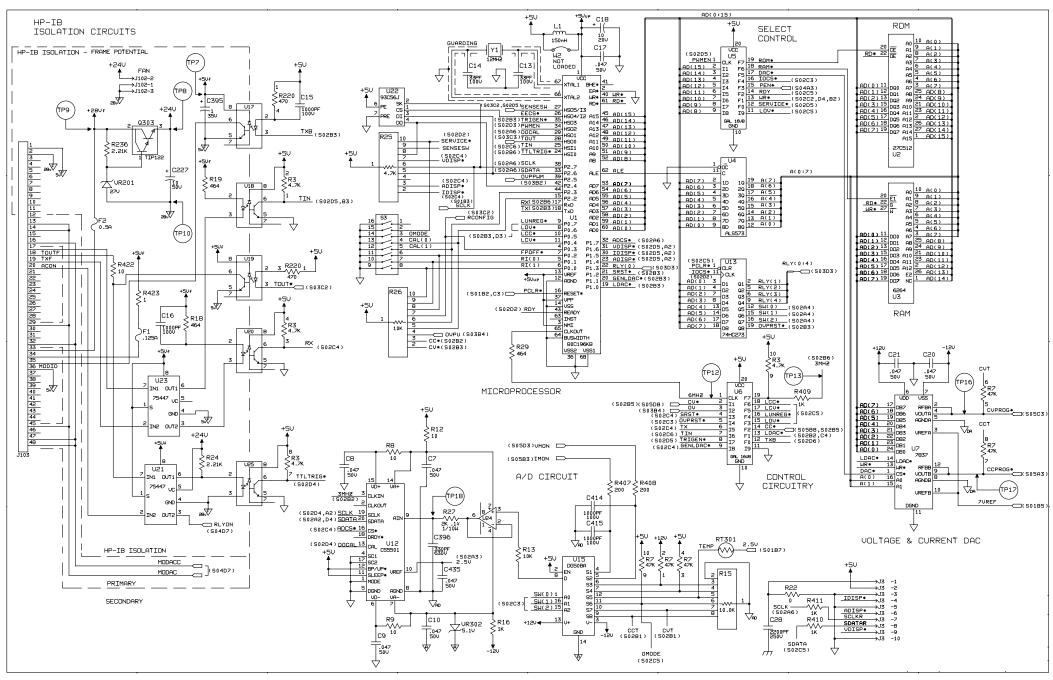




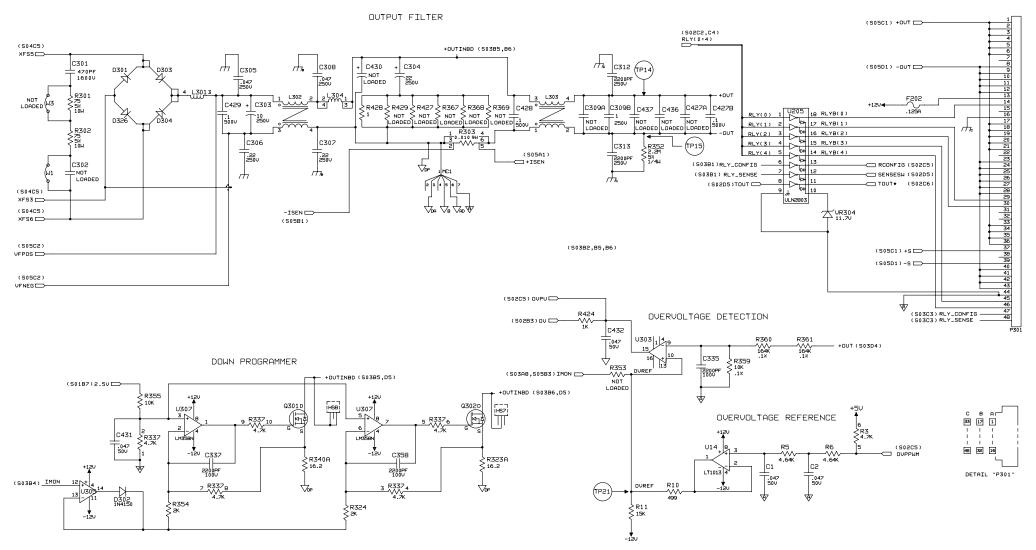




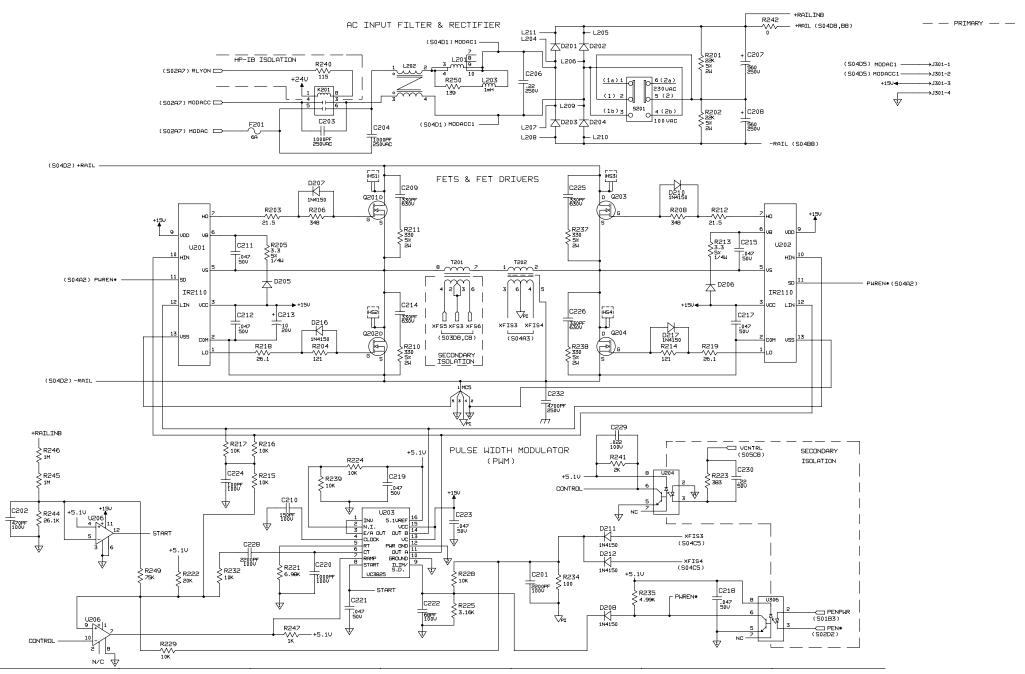
66105-60022 **Power Board Assembly** Page 1 of 6



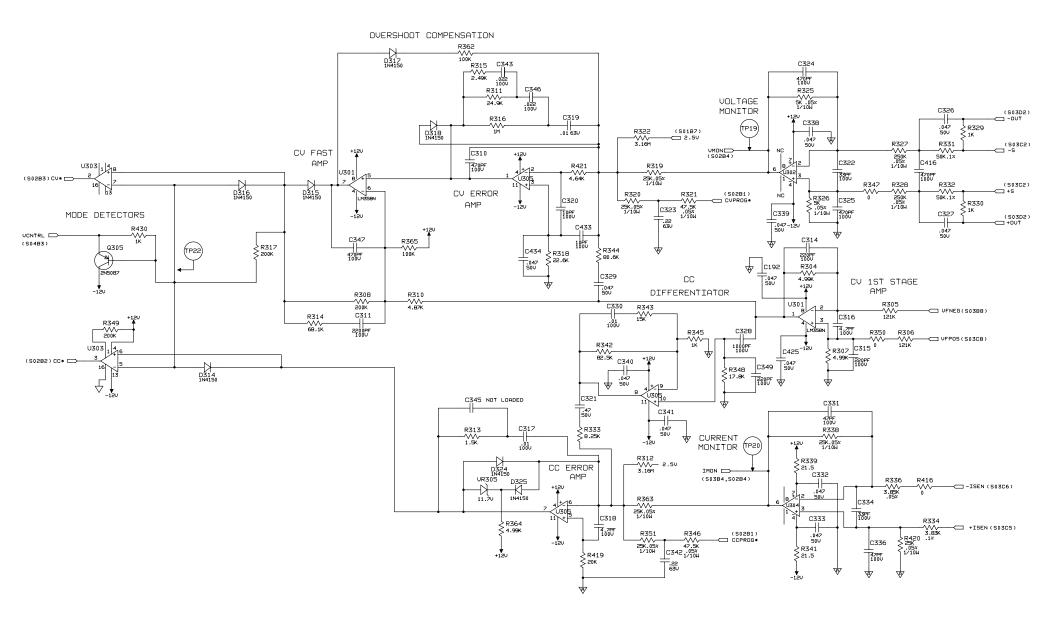
66105-60022 Power Board Assembly Page 2 of 6



66105-60022 Power Board Assembly Page 3 of 6

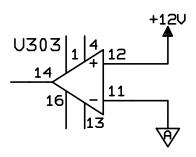


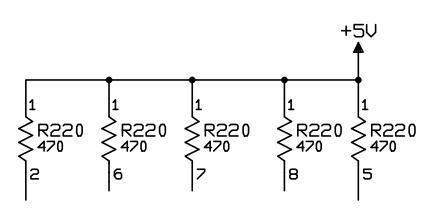
66105-60022 Power Board Assembly Page 4 of 6



66105-60022 Power Board Assembly Page 5 of 6

# UNUSED GATES/SIP'S





POWER	GND
VCC (+5V) +5VF +12V -12V +15V +28VF	GND GND1 GND2 GNDA GNDB GNDDP GND5VF CHASSIS CHASSISC

Agilent 66105A DC Power Module, 120V, 1.25A

66105-60022 Power Board Assembly Page 6 of 6

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
C001, 2, 4-10, 17, 20-24, 27, 192, C211, 212, 215, 217-219, 221, 223, C326, 327, 329, 330, 332, 338-341, C404, 418, 420-422, 425, 431, 432, C435	43	0160-5422	CAP-FXD 0.047uF +-20pct 50 V CER X7R	C420C473M5R5CA DA13X7R1H473M SA205C473MAAH	KEMET ELECTRONICS TDK AVX
C003, 11, 12, 18, 213, 407	6	0180-4136	CAP-FXD 10uF +-10pct 20 V TA	TARS106K020 T322C106K020AS	AVX KEMET ELECTRONICS
C013, 14, 322, 334	4	0160-4807	CAP-FXD 33pF +-5pct 100 V CER C0G	C410C330J1G5CA SA102A330JAAH SA102A330JAAH	KEMET ELECTRONICS AVX KYOCERA
C015, 16, 220, 328, 414, 415	6	0160-4822	CAP-FXD 1000pF +-5pct 100 V CER C0G	C420C102J1G5CA SA201A102JAAH SA201A102JAAH	KEMET ELECTRONICS AVX KYOCERA
C028, 312, 313	3	0160-4281	CAP-FXD 2200pF +-20PCT 250 V PPR-MET	MP3Y2- 2200F/250VAC/20%,4X8.5X1 3.5, Pitch10mm PME271Y422MR30	WIMA EVOX/RIFA
C201, 228, 311, 335, 337, 358	6	0160-4830	CAP-FXD 2200pF +-10pct 100 V CER X7R	C410C222K1R5CA SA101C222KAAH SA101C222KAAH	KEMET ELECTRONICS AVX KYOCERA
C202, 310, 324, 325, 347, 416	6	0160-4808	CAP-FXD 470pF +-5pct 100 V CER C0G	C410C471J1G5CA SA101A471JAAH SA101A471JAAH	KEMET ELECTRONICS AVX KYOCERA
C203, 204, 403	3	0160-4183	CAP-FXD 1000pF +-20pct 250 V PPR-MET	PME271Y410MR30	EVOX/RIFA
C206, 306-307	3		CAP-FXD 0.22uF +-10pct 250 V PPR-MET	PME2717410MR30	EVOX/RIFA
C207, 208	2		CAP-FXD 560uF +-20pct 250 V AL-ELCTLT	380LX561M250K022 LLS2E561MELB	CORNELL-DUBILIER ELECTRONICS NICHICON NIPPON CHEMI-CON
C209, 214, 225, 226, 396	5	0160-7578	CAP-FXD 330pF +-5pct 630 V POLYP-FL	FKP3 330PF/5%/630VDC/PCI	WIMA
C210	1		CAP-FXD 150pF +-5pct 100 V CER COG	C410C151J1G5CA SA101A151JAAH SA101A151JAAH	KEMET ELECTRONICS AVX KYOCERA

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
C222	1	0160-4803	CAP-FXD 68pF +-5pct 100 V CER C0G	SA101A680JAA	KEMET ELECTRONICS AVX KYOCERA
C224	2	0160-4801	CAP-FXD 100pF +-5pct 100 V CER C0G		KEMET ELECTRONICS AVX KYOCERA
C227	1	0180-3680	CAP-FXD 10uF +-20PCT 50V AL-ELCTLT	EKMG500ELL100ME11D	NIPPON CHEMI-CON
C229, 343, 346	3		CAP-FXD 0.022uF +-10pct 100 V CER X7R	C420C223K1R5CA SA201C223KAAH	KEMET ELECTRONICS AVX KYOCERA
C230	1	0160-5098	CAP-FXD 0.22uF +-10pct 50 V CER X7R	SA405C224KAAH	KEMET ELECTRONICS AVX KYOCERA
C232	1	0160-4439	CAP-FXD 4700pF +-20pct 1 kV PPR-MET	PME271Y447MR30	EVOX/RIFA
C301	1		CAP-FXD 470pF +-10pct 1.6 kV POLYP-FL	FKP1 470PF/+- 10%/1600VDC/PCM15 KP1836-147/135	WIMA VISHAY
C303	1	0180-3648	CAP-FXD 10uF +-20pct 250 V AL-ELCTLT	517D106M250CG6AE3	VISHAY
C304	1		CAP-FXD 22uF +-20pct 250 V AL-ELCTLT		
C305, 308	2	0160-4323	CAP-FXD 0.047uF +-20PCT 275V PPR-MET		EVOX/RIFA WIMA
C309B	1	0160-5050	CAP-FXD 1uF +-10pct 250 V POLYE-MET		ASHCROFT ELECTRONIC WIMA VISHAY EVOX/RIFA STC
C314, 315, 349	3	0160-4812	CAP-FXD 220pF +-5pct 100 V CER C0G	SA101A221JAAH	KEMET ELECTRONICS AVX KYOCERA
C316, 318	2	0160-4795	CAP-FXD 4.7pF +-10.64pct 100 V CER C0G	SA102A4R7DAAH	KEMET ELECTRONICS AVX KYOCERA

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
C317, 330	2		CAP-FXD 0.01uF +-10pct 100 V CER X7R	C410C103K1R5CA	KEMET ELECTRONICS
,				SA101C103KAAH	AVX
				SA101C103KAAH	KYOCERA
C319	1	0160-5467	CAP-FXD 0.01uF +-10PCT 100V POLYE-MET	MKS 2	WIMA
				MMK5103K100J01L	EVOX/RIFA
C320, 433	2	0160-4791	CAP-FXD 10pF +-5PCT 100V CER C0G	C410C100J1G5CA	KEMET ELECTRONICS
				SA102A100JAA	AVX
				SA102A100JAA	KYOCERA
C321	1	0160-5468	CAP-FXD 0.47uF +-10pct 50 V POLYE-MET	MMK5474K50J01L6	EVOX/RIFA
C323, 342	2	0160-5892	CAP-FXD 0.22uF +-10PCT 63V POLYE-MET	MKT 1817 422 065	VISHAY
				MMK5224K63J01L4 BULK	EVOX/RIFA
C331, 336	2	0160-4805	CAP-FXD 47pF +-5pct 100 V CER C0G	C410C470J1G5CA	KEMET ELECTRONICS
				SA102A470JAAH	AVX
				SA102A470JAAH	KYOCERA
C395, 409	2	0180-4129	CAP-FXD 1uF +-10pct 35 V TA	TARR105K035	AVX
				T322B105K035AS	KEMET ELECTRONICS
C397, 412, 413	3	0160-4835	CAP-FXD 0.1uF +-10pct 50 V CER X7R	C420C104K5R5CA	KEMET ELECTRONICS
				SA105C104KAAH	AVX
				SA105C104KAAH	KYOCERA
C427B, 428B, 429	3		CAP-FXD 0.1uF +-20pct 500 V CER Z5U	565CBA501EY104MA03	VISHAY
D201-204	4	1901-1087	DIODE-PWR RECT 600V 3A 200NS	GI856	VISHAY
				MR856RLG	ON SEMICONDUCTOR
D205, 206, 216, 217	4	1001 1214	DIODE-PWR RECT 600V 1A 50NS	MUR160RLG	ON SEMICONDUCTOR
D205, 206, 216, 217	10		DIODE-SWITCHING 1N4150 50V 200MA 4NS	1N4150	FAIRCHILD SEMICONDUCTOR
· · · ·	10	1901-1090	DIODE-SWITCHING TN4130 30V 200MA 4N3	1N4150	ROHM
215-217, 302, D314-316				1114 150	KONIVI
D301, 303, 304, 326	4	1901-1199	DIODE-PWR RECT 600V 4A 50NS	MUR460RLG	ON SEMICONDUCTOR
D317, 318, 324, 325	4		DIODE-GEN PRP 200MA DO-35	FDH300	FAIRCHILD SEMICONDUCTOR
F001	1		FUSE-SUBMINIATURE .125A 125V NTD AX	025101.5 L	LITTELFUSE
F002, 202	2		FUSE-SUBMINIATURE .5A 125V NTD AX UL-LS		LITTELFUSE
F201	1		FUSE (INCH) 6A 250V NTD FE UL-LST	0312006.	LITTELFUSE
				AGC-6	COOPER INDUSTRIES
				SS6-6A	SAN-O INDUSTRIAL
F201a	2	2110-1107	FUHLR-CLP-TYP	1A1907-03	COOPER INDUSTRIES
J003	1			68794-118	FCI FRAMATOME BERG

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
J102	1	1252-0063	CONN-POST TYPE .100-PIN-SPCG-MTG-END	1100-8-103-01	METHODE ELECTRONICS
				22-27-2031	MOLEX
J103	1	1251-8410	CONN-POST TYPE 2.54-PIN-SPCG-MTG-END	10-8457-048-002-025	KYOCERA
				254-63-04-802	LABINAL COMPONENTS &
				413.865	SYSTEMS
				650478-5	ERNI-ELEKTRO-APPARATE
				86093487313765E1LF	TYCO ELECTRONICS AMP
					FCI FRAMATOME BERG
J301, 401	1			26-60-4040	MOLEX
J302	1			1107-8-105-01	METHODE ELECTRONICS
K201	1	0490-1781	RELAY 2C 24VDC-COIL 5A 250VAC	AZ2732-053-052	AMERICAN ZETTLER
				FBR621D024	FUJITSU
				RKS-11DX-24	SIEMENS
L001	1	9100-1610	INDUCTOR RF-CH-MLD 150nH +-20pct	1537-00	AMERICAN PRECISION
				15M150M	INDUSTRIES
				IM-4 .15UH 20%	GOWANDA ELECTRONICS
					VISHAY
L201	1	5080-2179	CHOKE-LINE		
L202	1		CHOKE-CM INPUT		
L301	1 1		CHOKE-OUTPUT		
L302, 303	2		CHOKE-OUTPUT CM		
L304	1		CHOKE-OUTPUT		
P301	1 1			5650868-5	TYCO ELECTRONICS AMP
F301	'	1232-0107	CONN-POST TIPE 2.54-PIN-SPCG-WITG-END	20-8477-048-002-025	KYOCERA
				20-0477-040-002-023	KTOOLKA
Q201-204	4	5060-3457	ASSY-HS IRF830		
Q201-204a	1	1205-0282	HEAT SINK PLSTC-PWR-CS	6025D	AAVID THERMALLOY
Q201-204b	1	1855-0510	TRANSISTOR MOSFET N-CHAN E-MODE TO-2	IRF830	VISHAY
Q201-204c	1	0361-1641	EYELET-RLD-FLG .121-OD .187-LG .0095-THK	GS 4-6 STEEL-TIN PLATE	STIMPSON EDWIN B
Q208	1	1854-0087	TRANSISTOR NPN 2N3417 SI PD=360MW	CEN897	CENTRAL SEMICONDUCTOR
Q301, 302	2	5060-3466	ASSY-FET HS		
Q301, 302a	1	1205-0298	HEAT SINK PLSTC-PWR-CS	6030D	AAVID THERMALLOY
Q301, 302b	1	1855-0631	TRANSISTOR MOSFET N-CHAN E-MODE TO-2	IRF740	VISHAY
Q301, 302c	1	0515-0104	SCREW-MACH M3 X 0.5 8MM-LG PAN-HD ; SC		HOUSE OF METRICS
				0515-0104	ILLINOIS TOOL WORKS
				0515-0104	MID-CONTINENT SCREW PROD
				0515-0104	TEXTRON
O204 2024	1	2050 0004	WASHED EL MITLO 2 O 2 2 MM ID C 25 MM OD	2050 0004	LIQUEE OF METRICS
Q301, 302d	1	3050-0891	WASHER-FL MTLC 3.0 3.3-MM-ID 6.85-MM-OD	19090-0091	HOUSE OF METRICS

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
Q301, 302e	1	0535-0031	NUT-HEX; W/LOCKWASHER M3 X 0.5 2.4MM-T	0535-0031	HOUSE OF METRICS
Q303	1	1854-0828	TRANSISTOR NPN SI DARL TO-220AB PD=65V		NEC ELECTRONICS ON SEMICONDUCTOR
Q305	1	1853-0569	TRANSISTOR PNP SI TO-92 PD 310MW	2N5087RLRAG	ON SEMICONDUCTOR
Q401, 404	2	5060-2942	ASSY-HS 317T		
Q401, 404a	1		EYELET-RLD-FLG .121-OD .187-LG .0095-THK	GS 4-6 STEEL-TIN PLATE	STIMPSON EDWIN B
Q401, 404b	1	1826-0393	IC PWR MGT-V-REG-ADJ-POS 1.2/37V 3 PINS	LM317T-NOPB	NATIONAL SEMICONDUCTOR
Q401, 404c	1	1205-0282	HEAT SINK PLSTC-PWR-CS	6025D	AAVID THERMALLOY
R001	1	0757-0447	RESISTOR 16.2K +-1pct .125W TF TC=0+-100	5053HD16K20F CMF-551622FT-1 NK4H.125W1%+/- 100PPM1622	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R002, 319, 320, 338, 351, 363, 420	7	0699-2246	RESISTOR 25K +-0.05pct .125W TF TC=0+-5	PR1/10T525K0.05% PTF-5625K00AT-16 UXBA25K000A	PRECISION RESISTIVE PRODUCTS VISHAY VISHAY BC COMPONENTS
R003, 337	2	1810-0483	NET-RES 5 4.7K OHM 10-PIN	4310R-4B4-472 MSP10A03-472G 750-103-R4.7K	BOURNS VISHAY TT ELECTRONICS
R004	1	0699-3414	RESISTOR 45K +-0.05pct .1W TF TC=0+-5	PTF-5645K0AT-16 UXBA45K000A	VISHAY VISHAY BC COMPONENTS
R005, 6, 21, 23, 421	5	0698-3155	RESISTOR 4.64K +-1pct .125W TF TC=0+-100	5053HD4K640F CMF-554641FT-1 NK4H.125W1%+/- 100PPM4641	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R007	1	1810-0355	NET-RES 5 47.0K OHM 10-PIN	4310R-7F1-473 MSP10A03-473G 750-103-R47K SR547KOHMS +-2%	BOURNS VISHAY TT ELECTRONICS STC
R008, 9, 12, 422	4	0757-0346	RESISTOR 10 +-1pct .125W TF TC=0+-100	5053HD10R00F CMF-5510R0FT-1 NK4H.125W1%+/- 100PPM10R0	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
R010	1	0698-4123	RESISTOR 499 +-1pct .125W TF TC=0+-100	5053HD499R0F CMF-554990FT-1 NK4H.125W1%+/- 100PPM499R0	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R011	1	0698-6619	RES-FXD 15K +-0.1PCT 0.125W TC 0+-25 0207	CMF-551502BT-9 MBB0207-25 0.1%15K	VISHAY VISHAY BC COMPONENTS
R013, 215-217, 224, 228, 229, 232, R239, 355	10	0757-0442	RESISTOR 10K +-1pct .125W TF TC=0+-100	5053HD10K00F CMF-551002FT-1 NK4H.125W1%+/- 100PPM1002	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R015	1	1810-0206	NET-RES 7 10.0K OHM 8-PIN	750-81 MSP08A01-103G 4308R-94Y-103LF	TT ELECTRONICS VISHAY BOURNS
R016, 247, 329, 330, 345, 409-411, R424, 430	10	0757-0280	RESISTOR 1K +-1pct .125W TF TC=0+-100	5053HD1K000F CMF-551001FT-1 NK4H.125W1%+/- 100PPM1001	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R018, 19, 29	3	0698-0082	RESISTOR 464 +-1pct .125W TF TC=0+-100	5053HD464R0F CMF-554640FT-1 NK4H.125W1%+/- 100PPM464R0	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R020	1	0698-4202	RESISTOR 8.87K +-1pct .125W TF TC=0+-100	5053HD8K870F CMF-558871FT-1 NK4H.125W1%+/- 100PPM8871	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R022, 347, 350, 416	4	8159-0005	RESISTOR 0 CWM	106 L-2007-1 YZO 1/4 Z-25 Z25C	MICRO-OHM GETTIG ENGRG & MFG TT ELECTRONICS ASJ KOA
R024, 236	2	0757-0430	RESISTOR 2.21K +-1pct .125W TF TC=0+-100	5053HD2K210F CMF-552211FT-1 NK4H.125W1%+/- 100PPM2211	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
R025	1	1810-0279	NET-RES 9 4.7K OHM 10-PIN	750-101 MSP10A01-472G 4310R-6F4-472LF	TT ELECTRONICS VISHAY BOURNS
R026	1	1810-0280	NET-RES 9 10.0K OHM 10-PIN	750-101 MSP10A01-103G 4310R-94Y-103LF	TT ELECTRONICS VISHAY BOURNS
R027, 402	2	0699-0486	RESISTOR 2K +-0.1pct .1W TF TC=0+-10	PR1/10TC102K0.1% PTF-562K0BT-13 UXBB2K0000B	PRECISION RESISTIVE PRODUCTS VISHAY VISHAY BC COMPONENTS
R028	1	0698-3445	RESISTOR 348 +-1pct .125W TF TC=0+-100	5053HD348R0F CMF-553480FT-1 NK4H.125W1%+/- 100PPM348R0	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R201, 202	2	0764-0045	RESISTOR 22K +-5pct 2W MO TC=0+-200	FP69 22K0 5% GS-3-2202J MO2C223J	VISHAY TT ELECTRONICS KOA
R203, 212, 339, 341	6	0698-3430	RESISTOR 21.5 +-1pct .125W TF TC=0+-100	5053HD21R50F CMF-5521R5FT-1 NK4H.125W1%+/- 100PPM21R5	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R204, 214	2	0757-0403	RESISTOR 121 +-1pct .125W TF TC=0+-100	5053HD121R0F CMF-551210FT-1	VISHAY BC COMPONENTS VISHAY
R205, 213	2	0683-0335	RESISTOR 3.3 +-5PCT .25W CF TC=0-400	CF 14 3R 5% CF1/4C3R3J	ASJ KOA
R206, 208, 407, 408	4	0757-0407	RESISTOR 200 +-1pct .125W TF TC=0+-100	5053HD200R0F CMF-552000FT-1 NK4H.125W1%+/- 100PPM200R0	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R210, 211, 237, 238	4	0698-3631	RESISTOR 330 +-5pct 2W MO TC=0+-200	FP69 330R 5% GS-33300	VISHAY TT ELECTRONICS

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
R220	1	1810-0203	NET-RES 7 470.0 OHM 8-PIN	4308R-94Y-471 750-81 MSP08A01-471G	BOURNS TT ELECTRONICS VISHAY
R221	1	0757-0290	RESISTOR 6.19K +-1pct .125W TF TC=0+-100	5053HD6K190F CMF-556191FT-1	VISHAY BC COMPONENTS VISHAY
R222, 419	2	0757-0449	RESISTOR 20K +-1pct .125W TF TC=0+-100	5053HD20K00F CMF-552002FT-1 NK4H.125W1%+/- 100PPM2002	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R223	1	0698-3446	RESISTOR 383 +-1pct .125W TF TC=0+-100	5053HD383R0F CMF-553830FT-1 NK4H.125W1%+/- 100PPM383R0	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R225	1	0757-0279	RESISTOR 3.16K +-1pct .125W TF TC=0+-100	5053HD3K160F CMF-553161FT-1 NK4H.125W1%+/- 100PPM3161	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R234	1	0757-0401	RESISTOR 100 +-1pct .125W TF TC=0+-100	5053HD100R0F CMF-551000FT-1	VISHAY BC COMPONENTS VISHAY
R235, 304, 307, 364	4	0698-3279	RESISTOR 4.99K +-1pct .125W TF TC=0+-100	5053HD4K990F CMF-554991FT-1 NK4H.125W1%+/- 100PPM4991	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R240	1	0698-4406	RESISTOR 115 +-1pct .125W TF TC=0+-100	CMF-551150FT-1 5053HD115R0F NK4H.125W1%+/- 100PPM115R0	VISHAY VISHAY BC COMPONENTS E-SIL COMPONENTS
R241, R324, 354	3	0757-0283	RESISTOR 2K +-1pct .125W TF TC=0+-100	5053HD2K000F CMF-552001FT-1 NK4H.125W1%+/- 100PPM2001	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
R242, W001	2	7175-0057	RESISTOR 0 CWM	5020CX0R000S12AAZ 5020CX0R000S12AAZ 7175-0057 V-10-22	VISHAY BC COMPONENTS VISHAY DOVER VESTAL ELECTRONIC DEVICES
R244	1	0698-3159	RESISTOR 26.1K +-1pct .25W TF TC=0+-100	MFS 1/4 D C 2612 F 5053HD26K10F CMF-552612FT-1 NK4H.125W1%+/- 100PPM2612	KOA VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R245, 246, 316	3	0698-8827	RESISTOR 1M +-1pct .125W TF TC=0+-100	5053HD1M000F CMF-551004FT-1	VISHAY BC COMPONENTS VISHAY
R249	1	0757-0462	RESISTOR 75K +-1pct .125W TF TC=0+-100	5053HD75K00F CMF-557502FT-1 NK4H.125W1%+/- 100PPM7502	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R250	1	0698-4099	RESISTOR 139 +-1pct .125W TF TC=0+-100	CMF-551390FT-1 230618681391 NK4H.125W1%+/- 100PPM139R0	VISHAY VISHAY BC COMPONENTS E-SIL COMPONENTS
R301, 302	2	0811-3891	RES 75 5pct 10W	CPCP-10 75 5% PV10SX-75 OHMS 5% PWRN10-7R-5%	VISHAY RCD COMPONENTS TT ELECTRONICS
R303	1	0811-3771	RES-FXD 0.25 OHM +-1PCT 5W TC -100PPM T	SPU053R25000FD1	VISHAY
R305, 306	2	0757-0467	RESISTOR 121K +-1pct .125W TF TC=0+-100	5053HD121K0F CMF-551213FT-1 NK4H.125W1%+/- 100PPM1213	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R308	1	0757-0270	RESISTOR 249K +-1pct .125W TF TC=0+-100	5053HD249K0F CMF-552493FT-1 NK4H.125W1%+/- 100PPM2493	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R309	1	0811-1732	RESISTOR 1 +-5pct 3W PWI TC=0+-50	CW-2B 1R0 5% T2B-9-1R5%	VISHAY TT ELECTRONICS

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
R310	1	0698-4444	RESISTOR 4.87K +-1pct .125W TF TC=0+-100	5053HD4K870F CMF-554871FT-1 NK4H.125W1%+/- 100PPM4871	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R311	1	0698-4486	RESISTOR 24.9K +-1pct .125W TF TC=0+-100	5053HD24K90F CMF-552492FT-1 NK4H.125W1%+/- 100PPM2492	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R312, 322	2	0699-0070	RESISTOR 3.16M +-1pct .125W TF TC=0+-100	B0207C3M160F CMF-553164FT-1	VISHAY BC COMPONENTS VISHAY
R313	1	0757-0427	RESISTOR 1.5K +-1pct .125W TF TC=0+-100	5053HD1K500F CMF-551501FT-1 NK4H.125W1%+/- 100PPM1501	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R314	1	0757-0461	RESISTOR 68.1K +-1pct .125W TF TC=0+-100	MF 1/4 D C 6812 F 5053HD68K10F CMF-556812FT-1 NK4H.125W1%+/- 100PPM6812	KOA VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R315	1	0698-4435	RESISTOR 2.49K +-1pct .125W TF TC=0+-100	5053HD2K490F CMF-552491FT-1 NK4H.125W1%+/- 100PPM2491	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R317, 349	2	0757-0472	RESISTOR 200K +-1pct .125W TF TC=0+-100	5053HD200K0F CMF-552003FT-1 NK4H.125W1%+/- 100PPM2003	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R318	1	0757-0349	RESISTOR 22.6K +-1pct .125W TF TC=0+-100	5053HD22K60F CMF-552262FT-1 NK4H.125W1%+/- 100PPM2262	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R321, 346	2	0699-2248	RESISTOR 47.5K +-0.05pct .125W TF TC=0+-5	PR1/10T547K5.05% PTF-5647K50AT-16 UXBA47K500A	PRECISION RESISTIVE PRODUCTS VISHAY VISHAY BC COMPONENTS

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
R323A, 340A	2			5053HD16R20F CMF-5516R2FT-1 NK4H.125W1%+/- 100PPM16R2	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R325, 326	2	0699-3415	RES-FXD 5K +-0.05PCT .1W TF TC=0+-5	PTF-565K0AT-16 UXBA5K0000A	VISHAY VISHAY BC COMPONENTS
R327, 328	2	0699-3104	RESISTOR 250K +-0.05pct .1W TF TC=0+-5	PTF-56-7 UXBA250K00A	VISHAY VISHAY BC COMPONENTS
R331, 332	2	0698-6353	RES-FXD 50K +-0.1PCT 0.125W TC 0+-25 0207	CMF-555002BT-9 MBB0207-25 0.1%50K	VISHAY VISHAY BC COMPONENTS
R333	1	0757-0441	RESISTOR 8.25K +-1pct .125W TF TC=0+-100	5053HD8K250F CMF-558251FT-1 NK4H.125W1%+/- 100PPM8251	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R334	1	0698-7933	RESISTOR 3.83K +-0.1pct .125W TF TC=0+-25	B0207E3K830B CMF-553831BT-9	VISHAY BC COMPONENTS VISHAY
R336	1	0699-3417	RESISTOR 3.85K +-0.05pct .1W TF TC=0+-5	PTF-563K850AT-16 UXBA3K8500A	VISHAY VISHAY BC COMPONENTS
R342	1	0757-0463	RESISTOR 82.5K +-1pct .125W TF TC=0+-100	5053HD82K50F CMF-558252FT-1 NK4H.125W1%+/- 100PPM8252	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R343	1	0757-0446	RESISTOR 15K +-1pct .125W TF TC=0+-100	5053HD15K00F CMF-551502FT-1 NK4H.125W1%+/- 100PPM1502	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R344	1	0698-4509	RESISTOR 80.6K +-1pct .125W TF TC=0+-100	5053HD80K60F CMF-558062FT-1 NK4H.125W1%+/- 100PPM8062	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
R348	1	0698-3136	RESISTOR 17.8K +-1pct .125W TF TC=0+-100	5053HD17K80F CMF-551782FT-1 NK4H.125W1%+/- 100PPM1782	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R352	1	0683-2255	RESISTOR 2.2M +-5pct .25W CF TC=0-830	CF 14 2M 5% CF1/4C225J	ASJ KOA
R359	1	0698-6360	RES-FXD 10K +-0.1PCT 0.125W TC 0+-25 0207	CMF-551002BT-9 MBB0207-25 0.1%10K	VISHAY VISHAY BC COMPONENTS
R360, 361	2	0698-7841	RESISTOR 164K +-0.1pct .125W TF TC=0+-25	B0207E164K0B CMF-551643BT-9	VISHAY BC COMPONENTS VISHAY
R362	1	0757-0465	RESISTOR 100K +-1pct .125W TF TC=0+-100	5053HD100K0F CMF-551003FT-1 NK4H.125W1%+/- 100PPM1003	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R365	1	0698-6358	RES-FXD 100K +-0.1PCT 0.125W TC 0+-25 020	RNS 1/8 E C 1003 B CMF-551003BT-9 MBB0207-25 0.1%100K	KOA VISHAY VISHAY BC COMPONENTS
R401	1	0699-1069	RESISTOR 229 +-0.1pct .125W TF TC=0+-25	B0207E229R0B CMF-552290BT-9	VISHAY BC COMPONENTS VISHAY
R406	1	0757-0437	RESISTOR 4.75K +-1pct .125W TF TC=0+-100	5053HD4K750F CMF-554751FT-1 NK4H.125W1%+/- 100PPM4751	VISHAY BC COMPONENTS VISHAY E-SIL COMPONENTS
R423, 428	2	0698-8812	RESISTOR 1 +-1pct .125W TF TC=0+-100	5053HD1R000F CMF-551R0FT-1	VISHAY BC COMPONENTS VISHAY
RT301	1	0837-0397	THERMISTOR CYL CHIP 10K-OHM	135-103LFW-J01	HONEYWELL
S003	1		SWITCH-DIP RKR 8-1A 0.05A 30VDC	76YY22318ST	GRAYHILL
S201	1	3101-2966	SWITCH-SL DPDT STD 5A 250VAC PC	4021.4922	MARQUARDT
T201	1	9100-5002	XFMR-POWER	9100-5002	AGILENT TECHNOLOGIES
T202	1	9140-0974	INDUCTOR-FIXED CURRENT SENSE INDUCTOR	PE-51718	TECHNITROL

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
T203	1	9140-0137	INDUCTOR RF-CH-MLD 1mH +-5pct	19M104J 2500-28 9220-28 IM6-1000UH 5%	GOWANDA ELECTRONICS AMERICAN PRECISION INDUSTRIES ARROW ELECTRONICS VISHAY
U001	1	1821-1479	IC 16-BIT MCU 16-MHZ CMOS 68-PLCC	С	INTEL
U001a	1	1200-1274	SOCKET-IC-PLCC 68-CONT SQUARE DIP-SLD		TYCO ELECTRONICS AMP FCI FRAMATOME BERG
U002	1	5080-2529	ROM-PRGMD 1818-4855		
U002a		1818-4855	IC 512K-BIT OTP 90-NS CMOS	M27C512-90B6	STMICROELECTRONICS
U002b	1	1200-0567	SOCKET-IC-DIP 28-CONT DIP DIP-SLDR	1-390262-2 DILB28P223TLF	TYCO ELECTRONICS AMP FCI FRAMATOME BERG
U003	1	1818-4134	IC 64K BIT SRAM 20-NS CMOS 28-DIP	CY7C185-20PXC	CYPRESS SEMICONDUCTOR
U004	1	1820-2724	IC LCH TTL/ALS TRANSPARENT OCTL	DM74ALS573BN SN74ALS573CN	FAIRCHILD SEMICONDUCTOR TEXAS INSTRUMENTS
U005	1	5080-2236	PRGMD-GAL,DECODE 1820-5398		
U005a			IC PLD EEPLD UNPRGMD CMOS GAL16V8	GAL16V8D-25QP	LATTICE SEMICONDUCTOR
U005b	2	1200-0639	SOCKET-IC-DIP 20-CONT DIP DIP-SLDR	1-390261-6 DILB20P-223TLF	TYCO ELECTRONICS AMP FCI FRAMATOME BERG
U006	1	5080-2530	GAL-PRGMD 1820-5398		
U006a	1	1820-5398	IC PLD EEPLD UNPRGMD CMOS GAL16V8	GAL16V8D-25QP	LATTICE SEMICONDUCTOR
U006b	2	1200-0639	SOCKET-IC-DIP 20-CONT DIP DIP-SLDR	1-390261-6 DILB20P-223TLF	TYCO ELECTRONICS AMP FCI FRAMATOME BERG
U007	1	1826-2402	D/A 12-BIT 24-PLASTIC CMOS	MX7837KN+ AD7837BNZ	MAXIM INTEGRATED PRODUCTS ANALOG DEVICES
U011	1	1826-2284	IC PWR MGT-V-REF-FXD 2.4/2.6V 8 PINS	LT1019ACN8-2.5	LINEAR TECHNOLOGY
U012	1	1826-2484	A/D 16-BIT 20-PLASTIC CMOS	CS5501-BP	CIRRUS LOGIC
U013	1	1820-3399	IC FF CMOS/HC D-TYPE POS-EDGE-TRIG COM		FAIRCHILD SEMICONDUCTOR TEXAS INSTRUMENTS ON SEMICONDUCTOR
U014	1	1826-1409	IC OP AMP LOW-NOISE DUAL 8 PIN DIP-P	LT1013CN8	LINEAR TECHNOLOGY
U015	1		ANALOG MULTIPLEXER CHNL 16 -DIP-P	DG508ACJ ADG508AKNZ	VISHAY ANALOG DEVICES
U017, 19, U018, 20, 25, 204, 3	3 7	1990-1502	OPTO-ISOLATOR LED-PDIO IF=8MA-MAX BVR	HCDL 4502 000E	AVAGO TECHNOLOGIES

Reference Designator	QTY	Agilent P/N	Description	MPN	Manufacturer
U021, 23	2	1820-2110	IC INTERFACE DRVR BIPOLAR NAND DUAL	SN75477P	TEXAS INSTRUMENTS
U024, 302	2	1826-1896	IC OP AMP PRCN 8 PIN DIP-P	LT1001CN8	LINEAR TECHNOLOGY
				LT1001CN8	MAXIM INTEGRATED
					PRODUCTS
U026	1	1826-2341	IC PWR MGT-V-REG-SWG 8 PINS DIP-P PKG	TI 7702DCD	TEXAS INSTRUMENTS
U201, 202	2		IC INTERFACE DRVR MOS GATED HIGH VOLT		INTERNATIONAL RECTIFIER
U203	1			UC3825N	TEXAS INSTRUMENTS
U205	1	1858-0069		ULN2803A	STMICROELECTRONICS
U206	1			LM319NNOPB	NATIONAL SEMICONDUCTOR
U22	1		IC 2K-BIT EEPROM 10-MS CMOS 8-PDIP	AT93C56A-10PU-2.7	ATMEL
U301	1			LF412CNNOPB	NATIONAL SEMICONDUCTOR
U303	1		IC COMPARATOR QUAD 16 PIN DIP-P		
U304	1			LT1001ACN8	LINEAR TECHNOLOGY
U305	1	1826-1553		LT1014DN	LINEAR TECHNOLOGY
U307	1	1826-0346	IC OP AMP GP DUAL 8 PIN DIP-P	LM358NNOPB	NATIONAL SEMICONDUCTOR
VR201	1	1902-0968	DIODE-ZNR 27V 5pct DO-35 PD=.4W TC=+.095	1N971B	MICROSEMI
VR302	1	1902-0951	DIODE-ZNR 5.1V 5pct DO-35 PD=.4W TC=+.035	SZ30035-9RL	TAK CHEONG ELECTRONICS
				1N5231B	MICRO COMMERCIAL
					COMPONENTS
VR304, 305	2	1902-0018	DIODE-ZNR 1N941 11.7V 5pct DO-7 PD=.5W	1N941	MICROSEMI
Y001	1		CRYSTAL-QUARTZ 12.000 MHZ	AT-51-12.000MHZ	NIHON DEMPA KOGYO
				HC49S-12MHZ	FOX ELECTRONICS
				KD2109	KYUSHU DENTSU

Manual Part Number: 5989-6869EN Printed in U.S.A. April 2007 Copyright © 2007 Agilent Technologies, Inc. All Rights Reserved.

